

Micrarionta; a group which should apparently be given generic rank. Anatomically, *Sonorella* is not closely related to the *Micrarionta* series, which has its center in southern and Lower California, and the adjacent border of Arizona. Data to be presented in our forthcoming report on southwestern snails collected in 1906 and 1907 indicate that *Sonorella*, while remarkably varied in anatomy specifically, yet shows no forms in any way connecting with the Californian types of *Helices*.

EXPLANATION OF FIGURES.

Plate XI, figs. 6, 7, 8. *M. desertorum*.

Fig. 9, genitalia of the same specimen; *d. s.*, dart sack; *epi.*, epiphallus; *fl.*, flagellum; *m. gl.*, mucus glands; *p.*, penis; *sp. d.*, lower portion of the duct of the spermatheca. The mucous glands and their ducts are shaded.

Fig. 10. Diagram of dart sack and mucous glands viewed from the side towards the vagina, showing the contiguous insertions of the mucous ducts.

SOME NEW CALIFORNIAN SHELLS.

BY WILLIAM HEALEY DALL.

Rissoa (*Alvania*) *grippiana* Dall, n. sp.

Shell small, brownish, solid, cancellate, with one and a half smooth nuclear and five and a half sculptured whorls, nucleus flattish, blunt, remaining whorls rotund, evenly enlarging; last whorl with 13-14 axial ribs crossed by somewhat more slender, equal, equidistant, spiral threads not tuberculate at the intersections, with three somewhat stouter spirals on the base; earlier whorls with two and then three spiral threads between the sutures; suture indistinct, aperture obovate, rounded in front, slightly angular behind, with a much thickened lip which in senile specimens is duplex at the margin. There is a very minute chink but no umbilicus. Length 8, max. diam. 1.5 mm.

Type specimens from Todos Santos Bay, Lower California, between tides, Hemphill, U. S. Nat. Mus. 46171; others from 12 fathoms sand, off the entrance to San Diego harbor, C. W. Gripp;

others at various localities north to San Pedro and Catalina Island, California, mostly beach specimens. The species recalls *R. tumida* Carpenter, but is much more elevated, though less so than *R. incurvata* Cpr., which is also a thinner shell. All three have very nearly identical sculpture.

BELA GRIPPI Dall, n. sp.

Shell small, straw-color or pale brown with occasional spiral bands of darker brown, or all brown; six-whorled, of which the first whorl and a half are white, polished, smooth and turgid, the subsequent portion of the shell having a dull surface; earlier whorls with the periphery nearer the anterior suture, the whorl behind the periphery somewhat flattened and compressed, crossed by low obscure riblets, about a dozen on the fourth whorl, which become obsolete later; the whorl in front of the periphery shows no axial sculpture; the whole whorl is spirally sculptured with narrow sharp incised lines, one dividing the space behind the periphery, and about five in front of the periphery on the penultimate whorl; on the last whorl between the periphery and the siphonal fasciole there are about twelve of these lines, though they probably vary in number with the individual, while the incremental lines are moderately conspicuous; outer lips thin, simple; pillar lips with a small deposit of white callus; aperture narrow, lunate; canal very short, wide, with an inconspicuous fasciole. Length 9, of spire 5, of aperture 4; max. diam. 3.5 mm.

Dredged off San Diego Bay, about five miles south of the entrance in fifteen fathoms, by C. W. Gripp, on a bottom of broken shell. This is a very well marked species, hardly to be compared with any other known from the coast. Seven specimens were obtained of which two are in Mr. Gripp's collection.

The shell has much the aspect of an *Anachis* but one specimen retained the dried animal and by carefully soaking it out it proved to be a Pleurotomoid, with a short oval operculum with apical nucleus like that of *Bela*, though the shell from the absence of the strong axial ribs characteristic of most of the northern *Belas* has a very different aspect from the familiar forms of that genus. The animal is white, with short acute tentacles and very small black eyes.